

IN THE CLAIMS:

This listing of claims will replace all prior versions, and listings, of claims in the application:

1. (*Currently Amended*): A disk apparatus comprising:

an irradiation unit configured to irradiate a recording surface of a disk with a light beam;

a reflected light detection unit configured to detect reflected light of the light beam irradiated by the irradiation unit;

a focus control unit configured to control focus on the basis of a focus control signal generated from the reflected light detected by the reflected light detection unit;

a tilt amount detection unit configured to specify a plurality of regions with different radial positions on the disk, and to detect tilt amounts of respective regions with respect to an optical axis of the light beam irradiated by the irradiation unit on the basis of the focus control signal;

a tilt correction unit configured to calculate tilt correction values for respective regions in accordance with the tilt amounts of the respective regions detected by the tilt amount detection unit, and correct a tilt of the optical axis with respect to a predetermined region on the basis of the tilt correction value corresponding to the predetermined region;
[[and]]

a recording unit configured to record data on the predetermined region while the tilt of the optical axis with respect to the predetermined region is corrected by the tilt correction unit; and

a recording control unit configured, when data is continuously recorded on first and second, successive regions, to:

correct the tilt of the optical axis with respect to the first region based on a first tilt correction value using the tilt correction unit,

record data by tracing the light beam from the leading end to the trailing end of the first region by the first tilt correction value,

temporarily interrupt recording,

return tracing of the light beam to the first region and correct the tilt of the optical axis with respect to the first region based on a second tilt correction value using the tilt correction unit while tracing the light beam from the first region toward the leading end of the second region, and

record data by tracing the light beam from the leading end to the trailing end of the second region by the second tilt correction value.

2. (*Currently Amended*): An apparatus according to claim 1, further comprising a reproduction unit configured to reproduce data from the predetermined region while the tilt of the optical axis with respect to the predetermined region is corrected by the tilt correction unit; and

a reproduction control unit configured, when data is continuously reproduced from the first and second, successive regions, to:

correct the tilt of the optical axis with respect to the first region based on the first tilt correction value using the tilt correction unit,

reproduce data by tracing the light beam from the leading end to the trailing end of the first region by the first tilt correction value,

temporarily interrupt reproduction,

return tracing of the light beam to the first region and correct the tilt of the optical axis with respect to the first region based on the second tilt correction value using the tilt correction unit while tracing the light beam from the first region toward the leading end of the second region, and

reproduce data by tracing the light beam from the leading end to the trailing end of the second region by the second tilt correction value.

3. (*Original*): An apparatus according to claim 1, wherein the tilt amount detection unit detects a tilt amount of the optical axis with respect to a region bounded by two positions with different radial distances on the disk on the basis of a difference between bias components of two focus control signals corresponding to the two positions.

4.-5. (*Cancelled*).

6. (*Currently Amended*): A data recording method comprising:
specifying a plurality of regions with different radial positions on a disk, and detecting tilt amounts of the respective regions with respect to an optical axis of a light beam on the basis of a focus control signal used to just-focus the light beam on a recording surface of the disk;

calculating tilt correction amounts for the respective regions in accordance with the tilt amounts of the respective regions;

correcting a tilt of the optical axis with respect to a predetermined region on the basis of the tilt correction amount corresponding to the predetermined region; and

recording data on the predetermined region while the tilt of the optical axis with respect to the predetermined region is corrected[[]];

wherein, when data is continuously recorded on first and second, successive regions:

correcting the tilt of the optical axis with respect to the first region based on a first tilt correction value;

recording data by tracing the light beam from the leading end to the trailing end of the first region by the first tilt correction value;

temporarily interrupting recording;

returning tracing of the light beam to the first region and correcting the tilt of the optical axis with respect to the first region based on a second tilt correction value while tracing the light beam from the first region toward the leading end of the second region ; and

recording data by tracing the light beam from the leading end to the trailing end of the second region by the second tilt correction value.

7. (*Original*): A method according to claim 6, wherein the tilt amounts of the respective regions are detected using a method of detecting a tilt amount of the optical axis with respect to a region bounded by two positions with different radial distances on the disk on the basis of a difference between bias components of two focus control signals corresponding to the two positions.

8. (*Cancelled*).

9. (*Currently Amended*): A data reproduction method comprising:
specifying a plurality of regions with different radial positions on a disk, and detecting tilt amounts of the respective regions with respect to an optical axis of a light beam on the basis of a focus control signal used to just-focus the light beam on a recording surface of the disk;

calculating tilt correction amounts for the respective regions in accordance with the tilt amounts of the respective regions;

correcting a tilt of the optical axis with respect to a predetermined region on the basis of the tilt correction amount corresponding to the predetermined region; and

reproducing data from the predetermined region while the tilt of the optical axis with respect to the predetermined region is corrected[.];

wherein, when data is continuously reproduced from first and second, successive regions:

correcting the tilt of the optical axis with respect to the first region based on a first tilt correction value;

reproducing data by tracing the light beam from the leading end to the trailing end of the first region by the first tilt correction value;

temporarily interrupting reproduction;

returning tracing of the light beam to the first region and correcting the tilt of the optical axis with respect to the first region based on a second tilt correction value while tracing the light beam from the first region toward the leading end of the second region ; and

reproducing data by tracing the light beam from the leading end to the trailing end of the second region by the second tilt correction value.

10. (*Original*): A method according to claim 9, wherein the tilt amounts of the respective regions are detected using a method of detecting a tilt amount of the optical axis with respect to a region bounded by two positions with different radial distances on the disk on the basis of a difference between bias components of two focus control signals corresponding to the two positions.

11. (*Cancelled*).